

HYBRID ODONTOGENIC TUMOR: A UNIQUE PRESENTATION OF 3 DIFFERENT ENTITIES.

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INTRODUCTION

Hybrid neoplasms composed of 2 or more different histologic types occur rarely, but their occurrences have been relatively well recognized among odontogenic tumors. These have been referred to by other researchers as "hybrid" or "combined" lesions. Their clinical presentations are a continuum ranging from noninvasive cysts or hamartomas to benign and malignant neoplasms that vary greatly in their tendency for expansion and aggression. [1,2] Recently, in 2017[3], the World Health Organization published its new classification of odontogenic tumors; nevertheless, there was no mention of this kind of unusual pathology.

OBJECTIVE

Describe a unique presentation a hybrid odontogenic tumor with a combination of calcifying epithelial odontogenic tumor (CEOT), adenomatoid odontogenic tumor (AOT) and calcifying odontogenic cyst (COC).

CASE REPORT

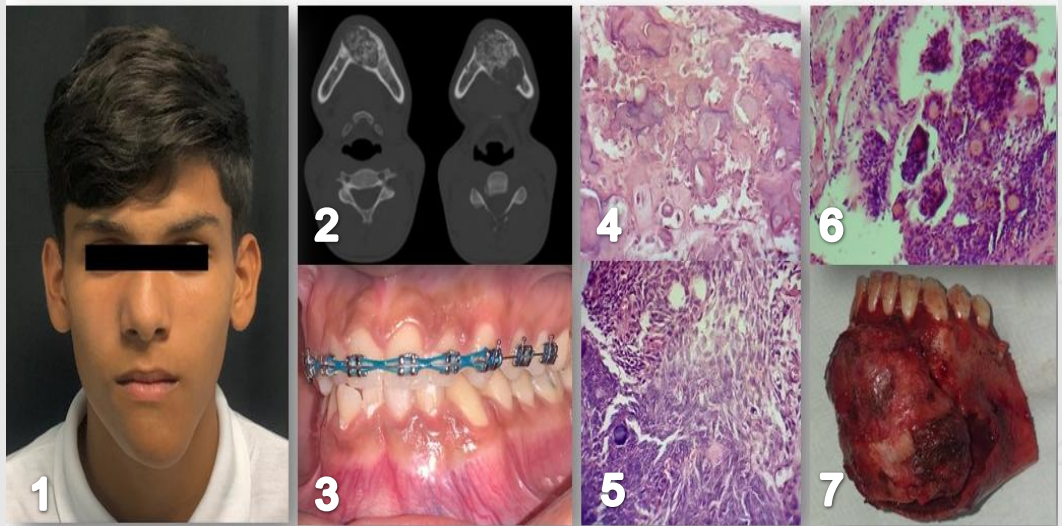
15-year-old: Male patient
6 months of evolution
Asymptomatic swelling in the mental area.

INCISIONAL BIOPSY

Atypical Hybrid Odontogenic Tumor.

The patient was submitted to a bloc resection from the left second molar to the right second premolar, including an area of 1 cm of bone beyond radiographical margins. A titanium plate was immediately placed, with no use of a bone graft due the lack of healthy soft tissue caused by the wide excision.

The entire specimen was sent for histopathological analysis and the diagnosis of **atypical hybrid odontogenic tumor** was confirmed.



1. Extraoral photograph showing facial asymmetry. 2. Axial view of a computed tomography scan showing a unilocular isodense mass delimited by a hyperdense border with multiple hyperdense particles inside. 3. Intraoral photograph showing buccal cortical plate expansion. 4. Hematoxylin and eosin-stained section showing round and polygonal cells, with some atypia, calcified material, as seen in calcified epithelial odontogenic tumor (magnification x200). 5. Hematoxylin and eosin-stained section showing oval cells, organized in concentric way, like adenomatoid odontogenic tumor (magnification x400). 6. Hematoxylin and eosin-stained section showing round hialanized structures, associated to epithelial, oval and hyperchromatic cells, with ameloblastic aspect, consistent with calcified odontogenic cyst (magnification x100).

CONCLUSION

Hybrid odontogenic neoplasms are rare and the incidence of a combination of these 3 entities is a unique presentation reported in the literature. There is still controversy in the choice of surgical treatment for these neoplasms. Conservative surgical management by enucleation and extensive procedures are mentioned in the literature, in our case, the presence of a combination of 3 entities, the large extension and aggression of the tumor, as well as the atypical cell cytology, demanded a wide excision with evidence of lesion-free surgical margins. Due to the lack of evidence in the treatment of choice, the surgeons should base the management by the aggressiveness of the tumor, possible recurrence and histopathological findings. Long-term follow up is remarkably necessary in all cases.

THE AUTHORS DECLARE THAT THEY HAVE NO CONFLICTS OF INTEREST

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